February 13, 2014

California Coastal Commission

c/o Sea-Level Rise Work Group

45 Fremont Street, Suite 2000

San Francisco, CA 94105

Re: Comments on *Draft Sea-Level Rise Policy Guidance* 

Dear Sir or Madam:

As a graduate student at the Monterey Institute of International Studies, focusing on ocean and coastal resource management, it is a privilege to be able to review the "Draft Sea-Level Rise Policy Guidance" document and to provide comments which will hopefully strengthen the final product. Though the draft document is lengthy and thorough, there are several points that seem to be lacking. The two main problems with the document revolve around questions of institution and planning. I recognize that considerable time and effort went into creating this draft document, therefore I appreciate the opportunity to offer recommendations on how to improve and continue to lead the nation, and in many cases the world, in adaptive coastal resource management.

The institutional issues are A) capacity and capability of local authorities and B) funding. The draft offers many valuable examples of how communities can address the issue of SLR, but it fails to prescribe adequate ways for local municipalities to implement strategies to counter these changes, nor does the document mention who will be helping local agencies. Section IV (Step 4) and V (Step 3) (on p. 49-63 and 71-76) addresses updating development standards and potential risks for new development along the coast. Neither Section IV nor V mention the sharing of information between land planners and local

partners. In all arenas of our society, communication is key, especially when trying to reduce the impacts of potential risks posed to people and the environment around them.

More funding and research is needed for local governments and agencies to make accurate predictions and to take effective measures against SLR. Pages six and seven address SLR projections and in order for this data to effectively be used, there is a need for more tide gauges and more frequent data collection. There is no logical explanation for using imprecise and sporadic numbers to predict what may happen along our coast in fifty to a hundred years. Also, the SLR predictions are exactly that—predictions. In order to protect coastal communities against future natural events, I would encourage that the government use the A2 scenario for SLR which is more rational than the B1 scenario.

On the planning side, I see issues with adequately addressing biodiversity, threatened and endangered species, and climate Refugio. Development issues can also be brought up. There is a need to encourage managed retreat in places, rather than to wait until the inevitable happens. A further need is to recognize the value to the coastal environment of natural protection, such as dune systems, rather than relying on hard protection structures. Hard protection structures often result in individual benefit to landowners and a loss to the community of public space and amenity values, as well as natural values such as biodiversity. For different existing infrastructure, such as roads, railways, ports, airports, and some coastal cities it makes sense to have exceptions for the type of protection; however, planners of new coastal development should consider the costs of having to put expensive protective barriers in place, often having to re-construct and improve structures, and while putting all this money and effort into these actions, the environment and natural watershed functions may be harmed.

Safeguarding the life-supporting capacity of the coastal environment's natural resources and ecosystems is in our best interest for maintaining the healthy functioning intertidal area and nesting and breeding areas for fish and birds. Here along the Monterey Bay, the history speaks for itself of the devastation

people have caused and continue to inflict on the marine and coastal habitats. The Monterey Bay is also living proof of how conservation and restoration efforts can be a useful tool and can help create effective buffers against a coastal squeeze between development and an advancing coastline.

It is extremely important to set clear guidelines for current property owners and future coastal developers. The process of adapting to future SLR will come down to timely implementation of the proper policies and strategies. The document clearly is not meant to regulate, but instead to guide local governments. Overall, I think this document makes it clear why it is important to establish guidelines for future development in areas potentially subject to SLR, but it needs more clarity and further consideration of exactly how policy makers will do this and how these policies will be carried out.

Sincerely,

Hanna Muegge